

What is claimed is:

1. A transcoder which inputs a first image signal encoded by a first compressing and encoding method and transcodes the first image signal to a second image signal encoded by a second compressing and encoding method, said transcoder comprising:

a picture selector which generates a subset image signal of the first image signal by extracting pictures of one or more specific types in frames or fields from the first image signal;

a first decoder which decodes the subset image signal generated by the picture selector; and

a first encoder which encodes the decoded image signal by a second compressing and encoding method;

wherein the picture selector uses the extracted pictures to generate the subset image signal whose effective length is reduced.

2. A transcoder which reads out a first image signal encoded by a first compressing and encoding method from a recoding medium and transcodes the first image signal to a second image signal encoded by a second compressing and encoding method, said transcoder comprising:

an interface section which generates a subset image signal of the first image signal by extracting pictures of one or more specific types in frames or fields from the

first image signal;

a first decoder which decodes the subset image signal generated by the interface section; and

a first encoder which encodes the decoded image signal by a second compressing and encoding method;

wherein the interface section uses the extracted pictures to generate the subset image signal whose effective length is reduced.

3. A transcoder according to claim 1, wherein the subset image signal has the extracted pictures arranged sequentially therein and the effective length of the subset image signal is reduced.

4. A transcoder according to claim 2, wherein the interface section extracts and reads out pictures of one or more specific types by referring to management information recorded along with the first image signal on the recording medium.

5. A transcoder according to claim 1, wherein the picture selector performs picture extraction in such a manner that each extracted picture can refer to another extracted picture for motion compensation.

6. A transcoder according to claim 1, wherein:

the first compressing and encoding method is an MPEG2 method and the second compressing and encoding method is an MPEG4 method; and

the picture selector generates the subset image

signal by extracting I-pictures and P-pictures.

7. A transcoder according to claim 1, wherein the picture selector allows the user to specify what types of pictures are to be extracted.

8. A transcoder according to claim 1, wherein a bit rate of the first image signal supplied to the picture selector is set so as to compensate for an amount of code of the pictures which are not extracted when the subset image signal is generated.

9. A transcoder according to claim 1, further comprising:

a frame memory for storing the image signal decoded by the first decoder; and

a display section which reads out the image signal from the frame memory and outputs the image signal to a display unit;

wherein images being transcoded are displayed on the display unit.

10. An imaging apparatus using the transcoder according to claim 1, said imaging apparatus comprising:

an image pickup section which picks up an object;

a second encoder which, by the first compressing and encoding method, encodes the first image signal supplied from the image pickup section; and

a recording and reproducing section which records and reproduces the first image signal encoded by the second

encoder to and from a recording medium,

wherein the first image signal reproduced from the recording medium is supplied to the transcoder.

11. An imaging apparatus according to claim 10, further comprising:

a receiver which receives an image signal from the outside;

wherein the second encoder encodes the image signal supplied from the receiver by the first compressing and encoding method.

12. An imaging apparatus according to claim 10, further comprising:

a receiver which receives the first image signal encoded by the first compressing and encoding method from the outside;

wherein the recording and reproducing section records and reproduces the first image signal supplied from the receiver to and from the recording medium.

13. An imaging apparatus according to claim 10, wherein the recording and reproducing apparatus generates management information from the first image signal recorded on the recording medium and records the management information on the recording medium.

14. A signal processor using the transcoder according to claim 1, wherein said signal processor inputs a first image signal encoded by a first compressing and

encoding method, transcodes the first image signal to a second image signal encoded by a second compressing and encoding method and outputs the second image signal to external equipment.